



## Syntactic Representation of Dative and Double Object Structures

Emad Ahmed Al-Tamari; Eyhab Abdulrazak Bader Eddin

English Department, Faculty of Languages and Translation, King Khalid University, Abha, Kingdom of Saudi Arabia

<http://dx.doi.org/10.47814/ijssrr.v5i4.300>

### **Abstract**

The aim of this study is to present a unified analysis of the dative structures. The study relies on data from English and Arabic that support “the single meaning approach”. According to this approach, both prepositional dative construction (PDC) and double object construction (DOC) are related semantically and syntactically. We propose a dative phrase “DATP” as a complement of the dative verb in both PDC and DOC. Our proposed analysis deals with the restrictions that scope and c-command bring on the order of the direct and indirect objects in PDC and DOC. We follow Bruening (2014, 2018) in his argument against c-command and show that “precede-and-command” (precede and phase command) that he proposes as a replacement for c-command fits neatly in our analysis.

**Keywords:** *Dative Alternation; Arabic; Single Meaning Approach; Multiple Meaning Approach; Direct/Indirect Object*

### **1. Introduction**

Syntactic and semantic representation of dative and double object structures has been a controversial issue. Linguists have been divided on whether prepositional dative construction (PDC) and double object construction (DOC) belong to one underlying structure, or they are distinct semantically and syntactically:

- (1) John gave the book to Mary. (PDC)
- (2) John gave Mary the book. (DOC)

The vast majority of works considered (1) and (2) distinct semantically and syntactically. Recent works, however, have argued that dative and double object structures are semantically related; hence, they are syntactically related. In this paper, we focus on the syntactic representation of PDC and DOC in English and Arabic. We argue here that any syntactic representations for PDC and DOC should rely on the semantic analysis of the two structures. If we argue that the two constructions are semantically related, we then propose that they are syntactically related, too. However, if we argue that the two constructions are semantically distinct, we can propose that they are syntactically distinct, too. In other words, before we discuss the structures of prepositional dative and double object constructions, we must

first adopt one of the two approaches to these constructions. In the next sections, we will go over the two approaches to prepositional dative and double object constructions.

## 2. One or Two Underlying Structures

In this section, we shed the light on the two approaches that researchers followed to analyze PDC and DOC. Many dative alternation studies were devoted to answering one question: are PDC and DOC semantically and syntactically related? (e.g., Bresnan, 2007; Bresnan et al., 2007; Bresnan and Nikitina, 2009; Goldberg, 1995; Pesetsky, 1995; Bruening, 2001; Richards, 2001; Beck and Johnson, 2004, among others). In order to answer this question, researchers directed their efforts toward answering another question: do PDC and DOC have similar or distinct meanings? In an attempt to answer this question, two major approaches emerged, namely, the multiple meaning approach and the single meaning approach. The two approaches focus on the semantic relationship between the verb and its two internal arguments in DOC and PDC. The following two subsections present the discussions supported by the two approaches.

### 2.1 Multiple Meaning approach

The advocates of this approach argue that PDC and DOC are distinct semantically and syntactically (e.g., Green, 1974; Oehrle, 1976; Gropen et al., 1989; Pinker, 1989; Goldberg, 1995; Pesetsky, 1995; Harley, 1997, 2002; Bruening, 2001; Richards, 2001; Pylkkanen, 2002; Krifka, 2004; Beck and Johnson, 2004). According to this view, PDC and DOC are derived from two separate underlying structures and need not be treated as one. They base their argument on the idea that DOC and PDC present related but different meanings. Each structure is uniquely associated with a single semantic interpretation. The change in structure results in a change in “predicate meaning” (Pinker, 1989:63).

- (3) a. to cause X to go to Y (PDC)
- b. to cause Y to have X (DOC)

Therefore, the change from PDC to DOC results in a change from a “goal” to a “possessor”. The semantic role of *Y* in (3a) is a goal, but it is a possessor in (3b). The advocates of this approach debate that the direct object (*Y*) in DOC must be a recipient or possessor, but in PDC it entails “an endpoint of motion” (e.g., Green, 1974; Oehrle, 1976; Gropen et al., 1989). Moreover, the indirect object in PDC can be either animate or inanimate (4b and 5b), but it must be animate in DOC<sup>1</sup> (4a and 5a). The following examples are taken from Bruening (2018:123-124).

- (4) a. I kicked {her/\*the goal line} the ball. (recipient or possessor)
- b. I kicked the ball to {her/the goal line}. (endpoint of motion)
- (5) a. I took {him/\*the windowsill} a cup of coffee. (recipient or possessor)
- b. I took a cup of coffee to {him/the windowsill}. (endpoint of motion)

The fact that some verbs do not alternate and can only be found in either PDC or DOC is another argument that the proponents of this approach use to support their claim (e.g., Dryer, 1986).

- (6) a. John asked Mary a question.
- b. \*John asked a question to Mary.
- (7) a. John admitted his guilt to the judge.
- b. \*John admitted the judge his guilt.

Similarly, idioms are found in DOC but not in PDC (see Green, 1974; Harley, 2002; Krifka, 2004). The examples are taken from Bresnan et al (2007:71).

---

<sup>1</sup> Some verbs, like *give-type* verbs, require the indirect object to be animate in both structures (Rappaport Hovav and Levin (2008).

- (8) a. That movie gave me the creeps.  
b. \*That movie gave the creeps to me.
- (9) a. The lighting here gives me a headache.  
b. \*The lighting here gives a headache to me.

Counter evidence, nonetheless, was provided by Bresnan et al (2007: 72) arguing that even idioms can occur in both structures.

(10) . . .Orson Welles, who as the radio character, “The Shadow,” used to **give “the creeps” to countless child listeners**. . .

(11) She found it hard to look at the Sage’s form for long. The spells that protected her identity also **gave a headache to anyone trying to determine even her size**, the constant bulging and rippling of her form gave Sarah vertigo.

Dryer (1986:811) points out that dative alternation is not found in many languages. Instead, languages tend to use either PDC or DOC. He cites French as an example of languages that employ PDC but not DOC (12) and Ojibwa (Algonkian) as an example of languages that utilize DOC only:

- (12) Jean a donné le livre à Marie.  
John PERF give the book to Mary.  
“John gave the book to Mary.”

To summarize, the arguments provided by the proponents of the multiple meaning approach focus on three main points. The first one is the fact that the direct object has different semantic roles in both structures. While it has a recipient/ possessor role in DOC, it takes an endpoint of a motion/ goal role in PDC. The second point stresses the idea that some verbs are found either in PDC or DOC but not both. Finally, the fact that some languages use one structure but not the other indicates that PDC and DOC have different underlying structures.

## 2.2 Single meaning approach

Most of the works on dative alternation have supported the multiple meaning approach when dealing with dative alternation. Recently, more works have challenged this approach and argued that PDC and DOC are associated with the same meaning and that they are not distinct ((Baker, 1988, 1997; Bresnan, 2007; Bresnan et al., 2007; Bresnan and Nikitina, 2009; Ormazabal & Romero, 2007, 2010; Rappaport Hovav and Levin, 2008). Baker (1988, 1997)<sup>2</sup> argues that PDC and DOC have one underlying structure since they have “identical thematic relations”. The NPs in (13a and b) have identical thematic roles of theme and recipient (1997:86):

- (13) a. I gave the candy (theme) to the children (recipient).  
b. I gave the children (recipient) the candy (theme).

Rappaport Hovav and Levin (2008) (Hovav and Levin henceforth) argue against the multiple meaning approach and provide counter explanations related to the “verb’s core meaning” as its “root” and how certain “event schemas are associated with the root” rather than accepting generalized interpretations of dative verbs. They call for “a verb sensitive analysis” where “a verb’s own meaning plays a key role in determining its argument realization options” (129). They show that a “verb-sensitive approach” is more precise in reflecting the real interpretation of PDC and DOC. They focus on three types of verbs, namely, “give-type”, “throw-type”, and “send-type”.

(14) and (15) summarize the differences between the two approaches thus far (132).

---

<sup>2</sup> **Uniform Theta Assignment Hypothesis** (Baker, 1988:46)

Identical thematic relationships between items are represented by identical structural relationships between those items at the level of D-structure.

(14) A summary of the verb-sensitive approach (single meaning approach)

	<u>to Variant</u>	<u>Double Object Variant</u>
give-type Verbs:	caused possession	caused possession
throw-type Verbs:	caused motion or caused possession	caused possession

(15) A summary of the uniform multiple meaning approach

	<u>to Variant</u>	<u>Double Object Variant</u>
All Dative Verbs:	caused motion	caused possession

Working on a “verb-sensitive” analysis of PDC and DOC, Hovav and Levin show that both structures with *give*-type verbs have the interpretation of “caused possession schema”, while *throw*-type verbs may have the interpretation of “caused possession” and “caused motion” schemas. This is contrary to the interpretations of the multiple meaning approach, which treats all verbs as having “caused motion” interpretation in PDC and “caused possession” interpretation in DOC. Hovav and Levin argue that in the case of *give*-type verbs in PDC, the change is in the “possessional field” because there is no change involved in the “spatial location” of the theme. They maintain that the “*to* phrase” associated with *give*-type verbs can only take “possessional goals”, but it takes either possessional or spatial goals with *throw*- and *send*-type verbs. Citing Levinson (2005), they provide the following examples to support their argument (2008:137):

- (16) a. \*Where did you give the ball?  
b. Where did you throw the ball? To third base.  
c. Where did you send the bicycle? To Rome.

The ungrammaticality of (16a), they argue, results from the fact that the *to phrase* is not a spatial goal. (16b and c) are grammatical because the *to phrases* are spatial goals. One more argument that supports their case is the fact that the object of *to* must be animate with *give*-type verbs, but it can be either animate or inanimate with *throw*-type and *send*-type verbs. In other words, the object of *to* with *give*-type verbs cannot be a complement that “designate places” since it can only express a caused possession meaning (2008:138).

- (17) a. I gave the package to Maria/\*London.  
b. I sent the package to Maria/London.  
c. I threw the ball to Maria/the other side of the field.

Other works map the syntactic structures of a verb’s arguments as realizations of “event schema”. For example, the verbs *give*, *rent*, and *lend* lexicalize for a caused possession event schema in both PDC and DOC, but *throw*-type and *send*-type verbs lexicalize for a caused possession event schema in DOC and caused possession and a caused motion in PDC (Pinker, 1989; Goldberg, 1997; Hovav and Levin, 2008). In other words, the realizations of the verb’s arguments in one structure or another are affected by the “core meaning” of the verb.

Evidence from Arabic supports the single meaning approach. One important point we can raise regarding alternating verbs in Arabic is that they express caused possession interpretation in both PDC and DOC forms. However, non-alternating verbs may express other interpretations in addition to caused possession. In other words, if a verb expresses meanings other than caused possession, alternation is not allowed.

The meaning of the Arabic preposition “*li*” is similar to the meaning of “*to*” in English. It can designate a recipient (19) or a spatial goal (18). In addition to that, *li* is also used to designate a beneficiary object and would be equivalent to *for* as in (22). Another Arabic preposition that is also

equivalent to “to” is *ʔilā*. This preposition, on the other hand, indicates an endpoint of a movement, which can be a place (20) or a person (21)<sup>3</sup>. When *li* designates a spatial goal or an endpoint of a movement, it has the same meaning as *ʔilā*:

- (18) ḍahab-tu li-s-sūq-i bākīr-an  
went-I to-the-market-GEN early-ACC  
“I went to the market early.”
- (19) ʔaʕṭay-tu al-kitāb-a li-Ali-in  
gave-I the-book-ACC to-Ali-GEN  
“I gave the book to Ali.”
- (20) ḍahab-tu ʔilā as-sūq-i bākīr-an  
went-I to the-market-GEN early-ACC  
“I went to the market early.”
- (21) ḍahab-tu ʔilā Ali-in fī maktab-i-hi  
went-I to Ali-GEN in office-GEN-his  
“I went to Ali in his office.”
- (22) a. ʔiṣṭarā Ali-un kitāb-an (theme) li-Fātimat-in (Beneficiary)  
bought.3SGM Ali-NOM book-ACC for-Fatimah-GEN  
“Ali bought a book for Fatimah.”

In (18) *as-sūq* can only be understood as an endpoint of a movement. This is why *li* can be replaced by *ʔilā* (20). We argue here that the two meanings of *li* are a deciding factor about whether the verb alternates or not. In alternating verbs, *li* can only indicate a recipient, but in non-alternating verbs it can designate an endpoint movement of an object in addition to a recipient possibility. Moreover, the verbs that may use *li* with the endpoint of a movement interpretation can take *ʔilā*, too. These verbs allow only PDC:

- (23) a. marrar-tu al-kurat-a li-Ali-in  
passed-I the-ball-ACC to-Ali-GEN  
“I passed the ball to Ali.”  
b. \*marrar-tu Ali-an al-kurat-a  
passed-I Ali-ACC the-ball-ACC  
“I passed Ali the ball.”  
c. marrar-tu al-kurat-a ʔilā Ali-in  
passed-I the-ball-ACC to Ali-GEN  
“I passed the ball to Ali.”
- (24) a. dafaʕ-tu al-nuqūd-a li-Ali-in  
paid-I the-money-ACC to-Ali-GEN  
“I paid the ball to Ali.”  
b. \*dafaʕ-tu Ali-an al-nuqūd-a  
paid-I Ali-ACC the-money-ACC  
“I paid Ali the ball.”  
c. dafaʕ-tu al-nuqūd-a ʔilā Ali-in  
paid-I the-money-ACC to Ali-GEN  
“I paid the money to Ali.”

In addition to being a recipient, *Ali* in (23) and (24) can be understood as the endpoint of a movement. *Give*, on the other hand, does not allow this interpretation. Therefore, “*li*” can have only one interpretation when used with *give*-type alternating verbs in Arabic, which is a role of a recipient, and cannot be replaced by *ʔilā*:

- (25) a. aʕṭay-tu al-kurat-a li-Ali-in  
gave-I the-ball-ACC to-Ali-GEN

<sup>3</sup> *Li* and *ʔilā* have other meanings that are irrelevant to the current study.

- “I gave the ball to Ali.”  
b. aṣṭay-tu Ali-an al-kurat-a  
gave-I Ali-ACC the-ball-ACC  
“I gave Ali the ball.”  
c. \*aṣṭay-tu al-kurat-a ḥilā Ali-in  
gave-I the-ball-ACC to-Ali-GEN  
“I gave the ball to Ali.”

The same applies to the other alternating verbs in the *give*-type verbs.

- (26) \*aṭṣam-tu al-ruzz-a ḥilā al-walad-i  
fed-I the-rice-ACC to the-boy-GEN  
“I fed the rice to the boy.”  
(27) \*aqrāḍ-tu al-nuqūd-a ḥilā Ali-in  
lent-I the-money-ACC to Ali-GEN  
“I lent the money to Ali.”  
(28) \*Aḥjar-tu al-manzil-a ḥilā Ali-in  
rented-I the-house-ACC to Ali-GEN  
“I rented the house to Ali.”  
(29) \*biʿ-ṣ-tu al-sayyārat-a ḥilā Ali-in  
sold-I the-car-ACC to Ali-GEN  
“I sold the car to Ali.”

To sum up, the evidence presented through the analysis of the Arabic data shows that with alternating verbs, PDC and DOC seem to be related semantically. The discussion has revealed that the two structures are semantically identical with regard to the meaning of the recipient arguments as having caused possession interpretation only. This fact about the Arabic data supports the single meaning approach that underlies an analysis that treats PDC and DOC as belonging syntactically to one deep structure that has the same arguments which are realized differently. For example, if a verb's meaning entails a change of location, no alternation is allowed regardless of the syntactic properties of the verb. This shows an important connection between the syntactic realization of a verb's argument and the verb's “core meaning” which is responsible for whether a verb lexicalizes for a change of possession, a change of location, or both.

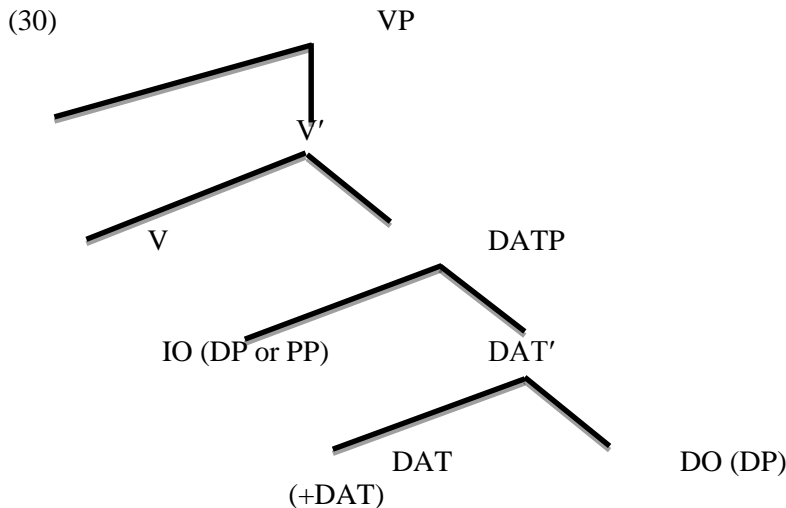
### 3. Our Proposal

#### 3.1 General framework

In this paper, we argue in favor of the single meaning approach where we assume that PDC and DOC have essentially the same underlying structure. The evidence presented through the analysis of the Arabic and the English data shows that with alternating verbs PDC and the DOC seem to be related syntactically and semantically. The data has revealed that the two structures are semantically identical with regard to the meaning of the recipient arguments as having caused possession interpretation.

A quick review of the literature shows that PDC and DOC have been treated from two points of view. Among those who argue that the two structures are semantically and syntactically related, one group of researchers argues that DOC is derived from PDC (e.g., Perlmutter & Postal, 1984; Larson, 1988, 1990, 2014; Ormazabal & Romero, 2010) while the others argue that PDC is derived from DOC (e.g., Bowers, 1981, Dryer, 1986, Aoun & Li, 1989, Hallman, 2015, 2018). The proponents of the second point of view (i.e., those who consider DPC and DOC to be semantically and syntactically distinct) argue that the two structures have distinct underlying structures (e.g., Green, 1974, Oehrle, 1976, Gropen et al., 1989; Pinker, 1989; Bowers, 1993; Hale & Keyser, 1993; Den Dikken, 1995; Pesetsky, 1995; Bruening, 2001; Hale & Keyser 2002; Harley 2002, 2004, 2007, 2012; Pylkkanen, 2002; Anagnostopoulou, 2003; Beck & Johnson, 2004).

In this paper, we argue that PDC and DOC have the same underlying structure and that neither PDC nor DOC is derived from the other. We argue that the verb’s “core meaning” is responsible for the structure be it PDC or DOC. In other words, the dative verb selects its complement as PDC or DOC. We follow Hovav and Levin in that there are “semantic schemas” associated with PDC and DOC structures and that the verb selects the schemas that represent its complement choice as PDC or DOC. Here we argue that dative verbs have Dative Phrases (DATP) as their complements. The indirect object DP (or the PP in PDC) occupies the specifier (spec) position in the DATP, while the direct object DP (in both structures) occupies the complement position as shown below:



Here we argue that the head DAT carries a +DAT feature that assigns the indirect object DP its thematic role in addition to assigning case to it. In DPC the thematic role is assigned through the preposition (see Bruening (2013) and Hallman (2018)).

### 3.2 C-command asymmetries and scope

Scope and c-command bring restrictions on the order of the direct and indirect objects in PDC and DOC. Brass and Lasnik (1986:143) present evidence that the indirect object (IO = DP<sub>2</sub>) must asymmetrically c-command the direct object (DO = DP<sub>1</sub>) in DOC:

- (31) a. I showed John himself (in the mirror).  
          him  
      b. \*I showed himself John (in the mirror).
- (32) a. \*Sally showed him<sub>i</sub> Dan<sub>i</sub>'s picture.<sup>4</sup>  
      b. That mistake cost Sally<sub>i</sub>'s husband her<sub>i</sub>. (stress on *her*)

Bruening (2010) presents examples where the IO takes scope over the DO in DOC. The universal quantifier “every” takes scope over an indefinite “a” (every > a). However, in PDC either object can take scope over the other:

- (33) a. I gave every child (IO) a different candy bar (DO). (every > a)  
      b. I gave a different child (IO) every candy bar (DO). (\*every > a)  
      c. I gave a different candy bar (DO) to every child (IO). (every > a)  
      d. I gave every candy bar (DO) to a different child (IO). (every > a)

<sup>4</sup> Taken from Bruening (2014:353)

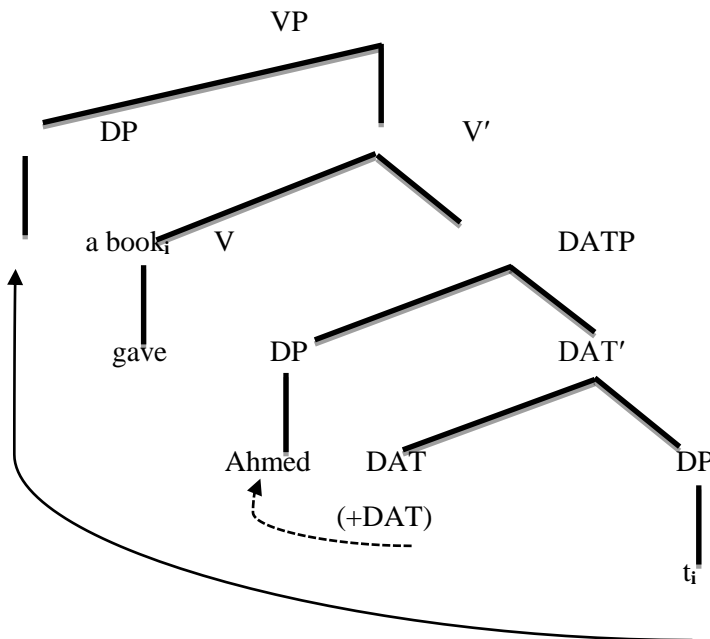
While the two DPs can take scope and symmetrically c-command each other in PDC, DP1 (IO) can take scope over DP1 (DO) and asymmetrically c-command it in DOC. In other words, the order of the two DPs in the underlying structure in any syntactic representation is irrelevant in PDC as long as the two DPs symmetrically c-command each other, but the indirect object must precede the direct object in DOC. Any syntactic representation of PDC and DOC must take these facts into consideration.

#### 4. Analysis

##### 4.1 Case Assignments:

Our analysis is based on the argument that PDC and DOC are semantically and syntactically related. We claim that our proposed analysis of dative verbs explains how DOC and PDC are derived from the same underlying structure. For scope and dominance reasons, we argue that the indirect object DP is higher than the direct object in what we refer to as “DATP”. We argue here that both objects need to be assigned accusative structural in DOC. In order for that to take place, the DO needs to move up in the tree to be assigned accusative case. The IO will be assigned inherent case through the head DAT<sup>5</sup>:

(34)



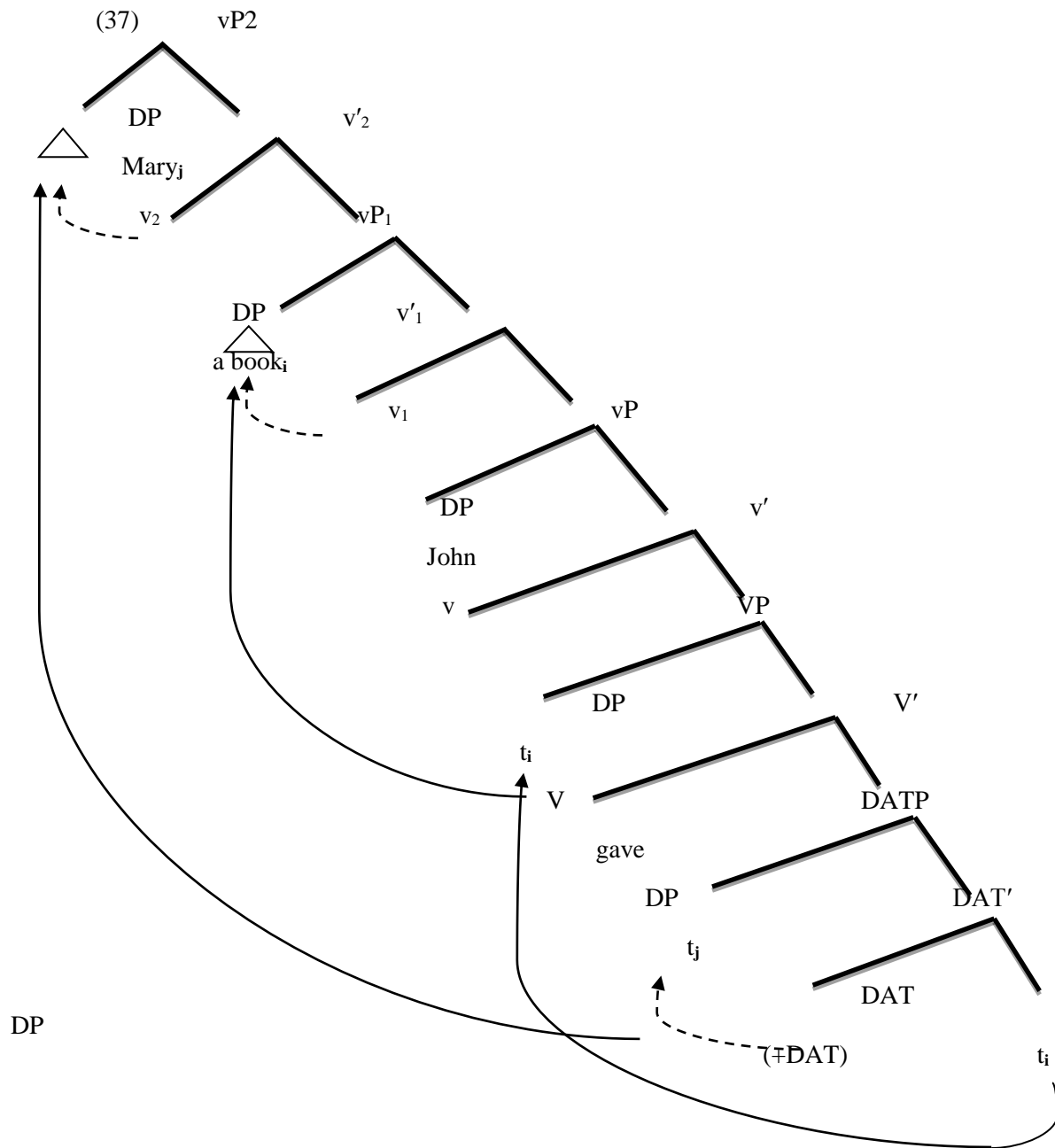
The verb will move up to assign case to the external argument. We notice that the DPs are in the wrong order. We follow Hallman (2018) that there is a force other than case that is enforcing the movement of the DPs higher in the tree where they are aligned correctly in the surface structure. Hallman suggests, following Chomsky (1995), Holmberg (2000) and others, that the movement of the two DPs in DOC to their surface positions is triggered by a licensing requirement of the “DP-ness” of a DP that he refers to as “D feature”. The D feature, he suggests, needs to be matched against a “little v”. Accordingly, the two DPs need to move higher to check their D features against functional heads that we refer to here as v1 and v2:

(35) John gave Mary a book.

(36) John gave a book to Mary.

<sup>5</sup> Hallman (2018) argues that IO receives an inherent dative case in its base by a functional head (Appl) that carries a +DAT feature through the dative marker. He argues that when the IO moves up the tree it is assigned accusative case and gets its D feature checked in the outer space of a higher functional head.

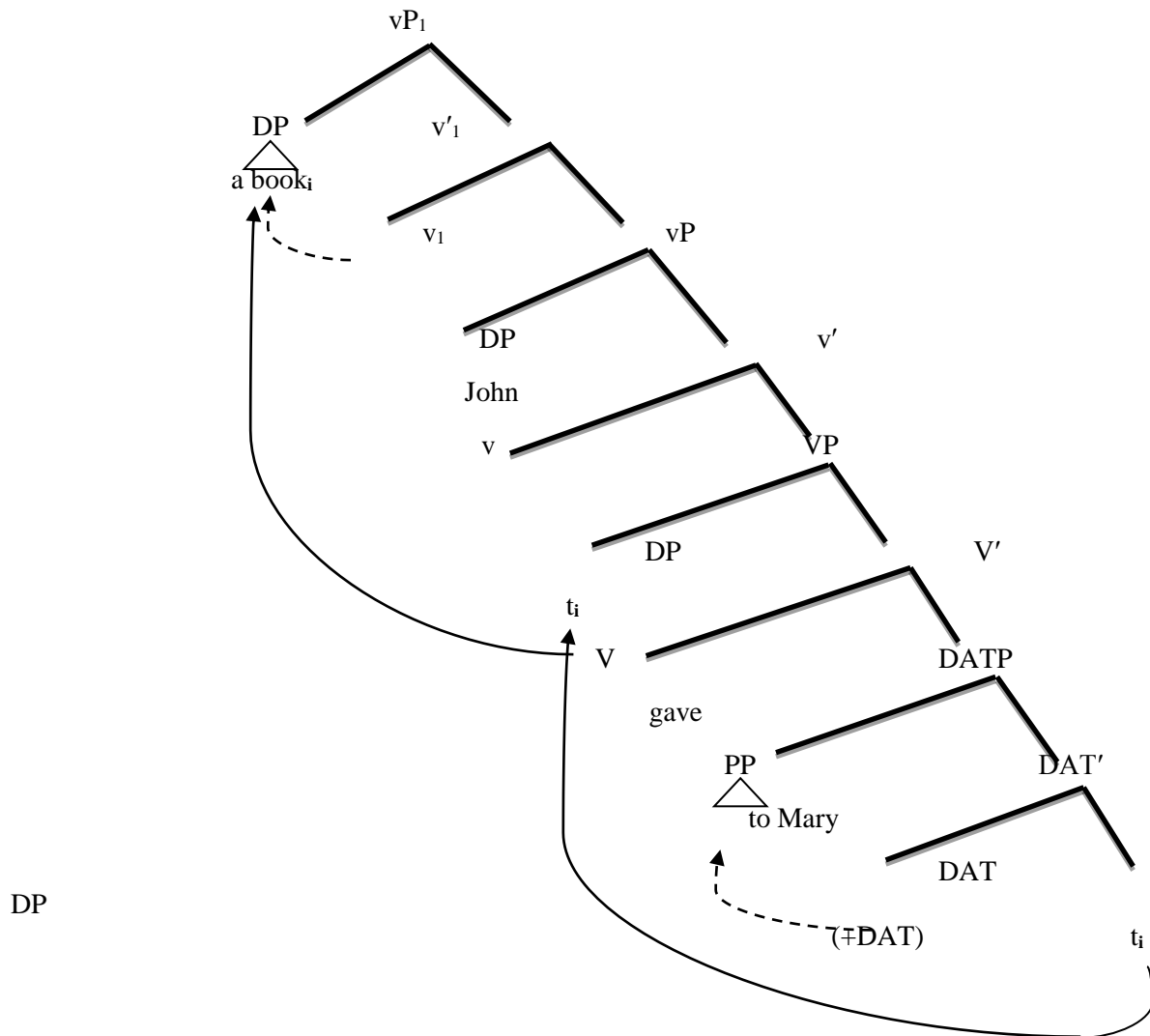




The theme DP moves to the spec of VP where it is assigned accusative case by the verb. Then, it moves up to the spec of the first available vP (vP<sub>1</sub>) to get its DP feature checked by the functional head “v<sub>1</sub>”. The recipient DP is assigned inherent dative case by the head DAT. To check its D feature and get assigned accusative case, it moves up to spec of vP<sub>2</sub> where it gets assigned accusative case and gets its D feature checked by the functional head “v<sub>2</sub>”. The verb and subject move up the tree and the subject gets assigned nominative case and gets its D feature checked.

With respect to PDC, the same underlying structure is proposed where the dative verb has a DATP complement. The PP with the indirect object DP is generated in the spec of the phrase, while the direct object DP is base-generated in the complement position of the head DAT.

(38)



Similar to the step taken in DOC, the theme DP moves up to the spec of VP where it is assigned accusative case by the verb. To check its D feature, it moves up to the spec of the first available functional phrase (vP). The indirect object is assigned inherent dative case by the head DAT through the preposition and genitive case by the preposition.<sup>6</sup> Similar to the DOC, the verb and the subject move up the tree where the subject is assigned nominative case by the verb.

Arabic has a structure similar to that of English when it comes to the surface order of the direct and indirect objects in dative structures:

(39) a. aṣṭa Ahmed-u Ali-an al-kurat-a.  
gave Ahmed-NOM Ali- ACC the-ball-ACC  
"Ahmed gave the ball to Ali."

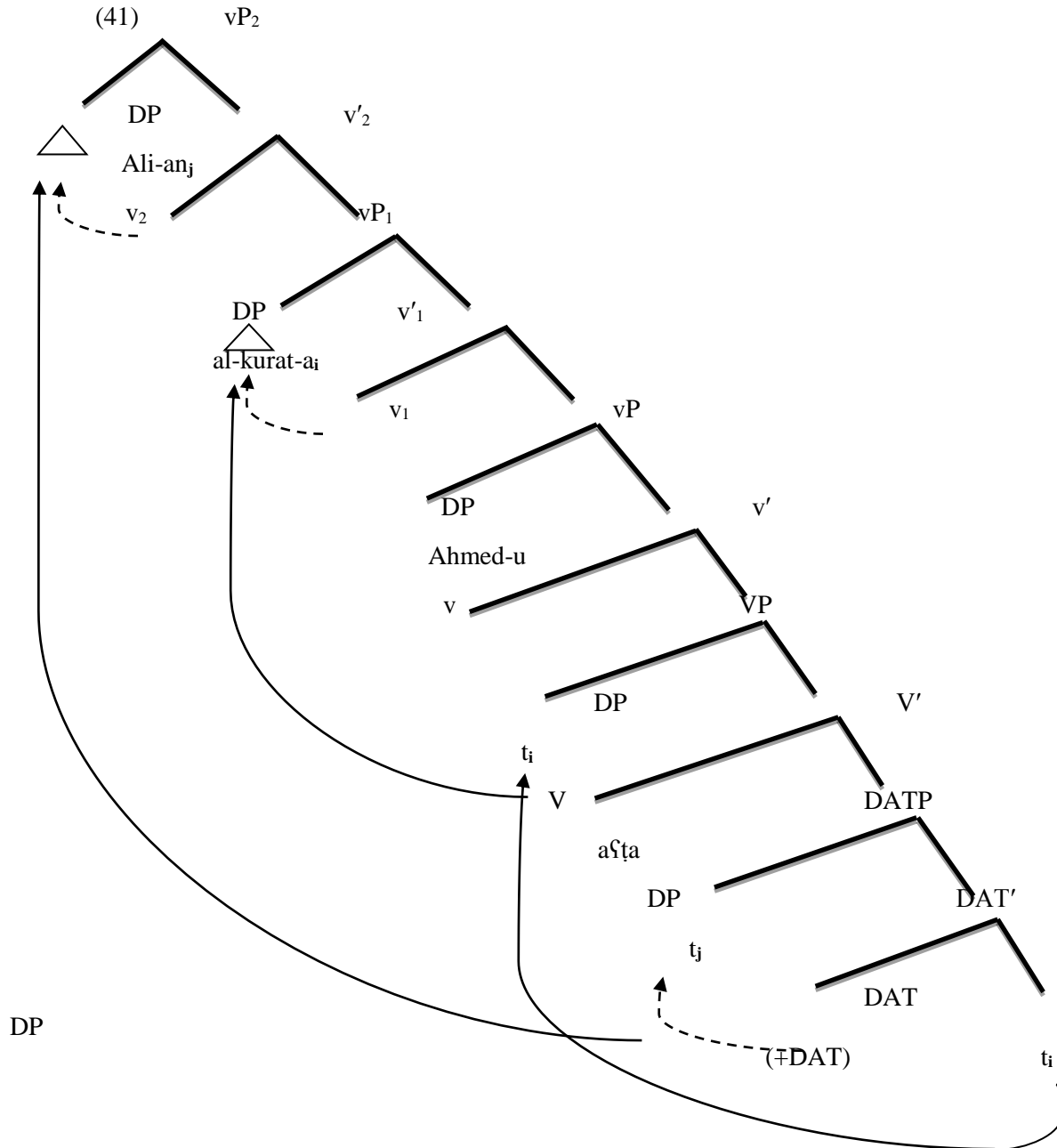
(40) a. aṣṭa Ahmed-u al-kurat-a li-Ali-in

<sup>6</sup> According to Bruening (2013) if an x' is a  $\theta$ -role assigner, then it can transfer the  $\theta$ -role associated with X to a prepositional phrase (through the preposition) to the DP inside the PP. Chomsky (Chomsky 1995:114) defines the condition under which inherent case can be assigned as:

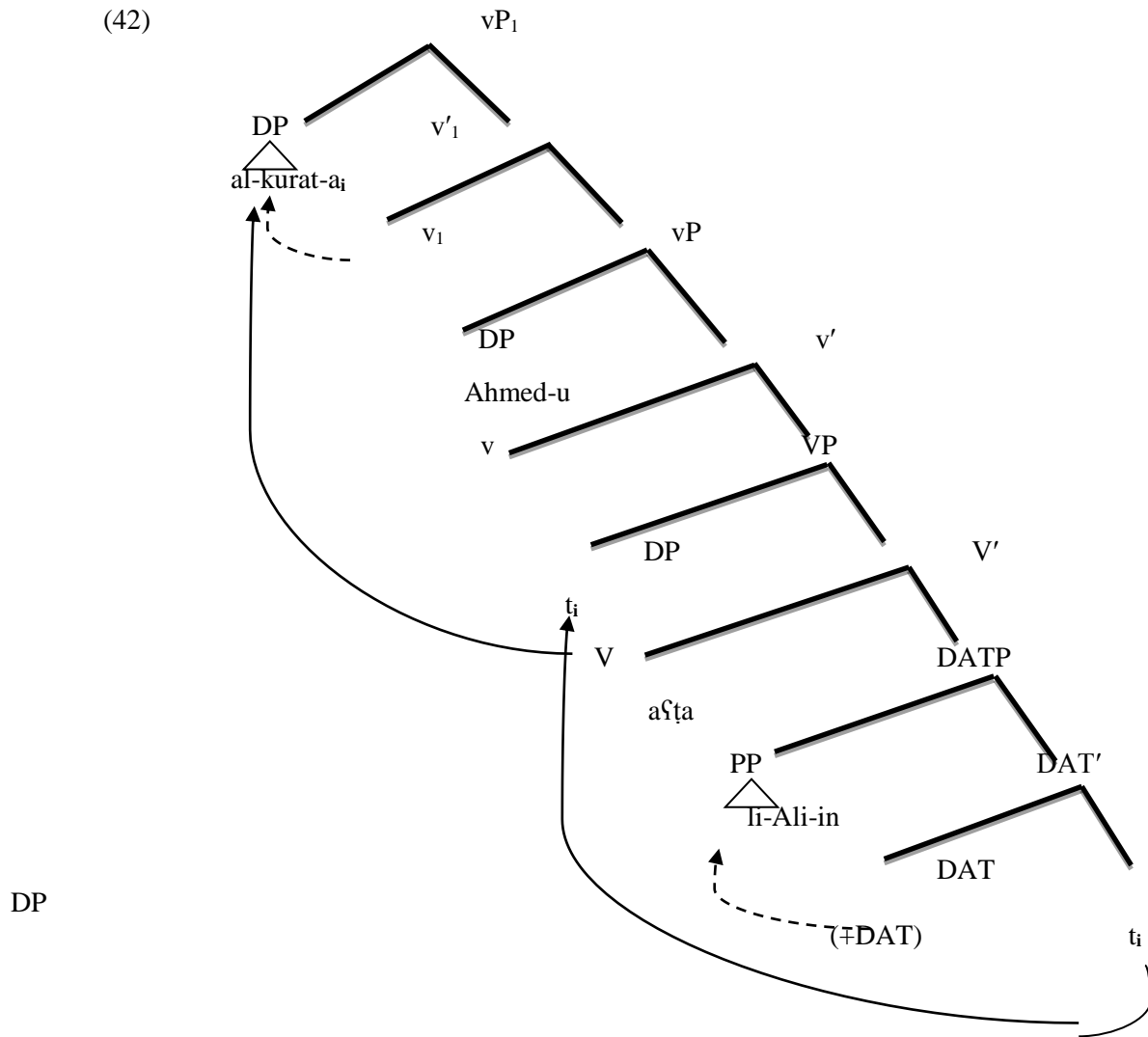
Inherent Case is assigned by  $\alpha$  to NP only if  $\alpha$   $\theta$ -marks NP.

gave Ahmed-Nom the-ball-ACC to-Ali-GEN  
“Ahmed gave the ball to Ali.”

The direct object “al-kurat-a” moves to the spec of VP to be assigned accusative case, and then moves to the spec of the nearest functional phrase “vP<sub>1</sub>” to check its D feature. Similarly, the indirect object “Ali-an<sub>j</sub>” is assigned inherent dative case by the head DAT, then it moves to the spec of the nearest functional phrase “vP<sub>2</sub>” where it is assigned accusative case and has its D feature checked. The subject and the verb move up higher in the tree where the subject is assigned nominative case by the verb.



Similar to English, PDC in Arabic also has a DATP as a complement of the verb. The spec of the DATP is occupied by the PP that has the indirect object DP, and the direct object DP will occupy the complement position of the head DAT:



The theme DP moves up to the spec of VP to be assigned accusative case, and then moves to the spec of vP<sub>1</sub> to check its D feature. The second DP inside the PP is assigned inherent dative case by the head DAT through the preposition which also assigns it genitive case. The verb and the subject will move up the tree where the subject is assigned nominative case.

The proposed underlying structure for PDC and DOC captures three facts. First, it presents the relationship between the two structures as having similar meanings. Second, it captures the surface order of the direct and indirect objects in English and Arabic. Third, it captures the variation found in different languages with the use of the two dative structures, PDC and DOC. The proposed underlying structure for dative verbs allows for and explains PDC and DOC surface structures. Therefore, this analysis will work for languages that allow DOC only, such as Algonkian. It also works for languages that allow PDC only, such as French.

In the next section, we show how our proposed analysis accounts for scope and c-command issues that are related to dative structures.

#### 4.2 Scope and c-command:

In section 3.2, we reviewed some facts that are related to scope and c-command in dative structures. In DOC, the indirect object (DP2), asymmetrically c-commands the direct object (DP1) and always has scope over it. In PDC, however, both DPs c-command each other, since both DPs can have scope over the other. With regard to c-command and scope in DOC, our analysis captures these observations as the structure shows that the second DP c-commands the first DP and not vice versa. After the movement of the two DPs, we still observe the c-command asymmetry as well as the scope issue.

(45) a. John gave every man a book. (every > a)

b. John gave a book every man. (\*every > a)

In the case of the PDC, serious issues arise since neither DP1 nor DP2 c-command the other. This brings us to Bruening (214, 2018) and others who argue that c-command is irrelevant to many syntactic relations including scope. Contrary to what Reinhart (1976, 1983) argued for, Bruening (2014, 2018) argues that “precedence” is relevant and c-command should be replaced by what he referred to as “phase-command”. He claims that only “phasal nodes” matter, not every node in the tree. He argues that precedence and phase-command are the relevant factors that explain certain syntactic phenomena such as binding relations and weak crossover. He defines phase-command as:

*Phase-command*

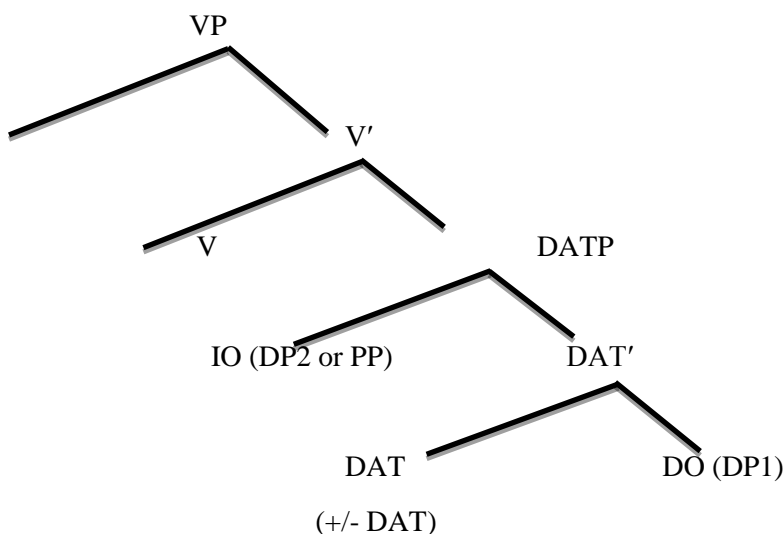
1) *X phase-commands Y if and only if neither X nor Y dominates the other and there is no ZP, ZP a phasal node, such that ZP dominates X but does not dominate Y.*

2) *Phasal nodes*  
*CP, VoiceP, NP*

Bruening (2014, 2018) suggests replacing c-command with what he refers to as “precede-and-command” which stands for “precede and phase-command”.

We follow Bruening (2014, 2018) and claim that “precede-and-command” does capture the order of the DPs in dative structures as well as the scope issues. In DOC, DP2 precede-and-commands DP1 and consequently can have scope over it:

(46)



DP1 does not precede-and-command DP2 and cannot have scope over it. Even after both DPs move up the tree for accusative case assignment and D feature checking, DP2 still precede-and-commands DP1. In PDC, DP2 precede-and-commands DP1, and hence can have scope over it. However, DP1 does not precede-and-command DP2 and cannot have scope over it. This contradicts the fact that DP1 can have scope over DP2. Examples (33c, d) are repeated here in (47):

(47) a. I gave a different candy bar (DP1) to every child (DP2). (every > a)

b. I gave every candy bar (DP1) to a different child (DP2). (every > a)

Before DP1 moves up the tree for case assignment and D feature checking, DP2 precede-and-commands it, so it can have scope over it as in (b). However, DP1 precede-and-commands DP2 after it moves up the tree which enables it to have scope over DP2.

### **Conclusion**

Two approaches to dative structures have been argued for. The advocates of the first approach, the multiple meaning approach, argue that DOC and PDC are distinct semantically and syntactically. As a result, they should have distinct underlying syntactic structures. The advocates of the second approach, the single meaning approach, on the other hand, argue that the two dative structures are semantically and syntactically related. Accordingly, some studies argue that DOC is derived from PDC and others argue for the opposite derivation, i.e., PDC is derived from DOC.

In this study, we briefly show evidence from Arabic that supports the single meaning approach. However, we argue that DOC and PDC have basically the same underlying structure. This study highlights the pros of this approach and shows how the two structures are derived from the same underlying structure into two distinct surface structures. The force that triggers the movement of DP1 is case assignment and D feature checking. DP2, on the other hand, is assigned inherent dative case by the head of the DATP, and its movement up the tree is for accusative case assignment and D feature checking. In PDC, DP2 is assigned inherent dative and genitive case by the functional head DAT and the preposition, and there is no need for it to move up the tree.

To deal with scope discrepancies and the order of the DPs in both structures, we follow Bruening (2014, 2018) by adopting his suggestion of replacing c-command with precede-and-command. We show how precede-and-command captures scope and DPs order neatly. Finally, our analysis of dative structures does not contradict with the variation of the use of DOC and PDC cross-linguistically. The purpose of this study is not to explain the use of DOC and PDC but rather how to syntactically derive them from one underlying structure.

### **Acknowledgments**

The authors extend their appreciation to the Deanship of Scientific Research at King Khalid University for funding this work through General Research Project under grant number (GRP-190-41/2020).

### **References**

- Anagnostopoulou, E. (2003). *The syntax of ditransitives*. Berlin: Mouton de Gruyter.
- Aoun, J. and Li, A.Y.-H. (1989). Scope and constituency. *Linguistic Inquiry* 20:141–172.
- Baker, M. C. (1988). *Incorporation: A theory of grammatical function changing*. Chicago, IL: University of Chicago Press.
- Baker, M. C. (1997). Thematic roles and syntactic structure. In Liliane Haegeman (ed.) *Elements of grammar: Handbook of generative syntax*. Dordrecht: Kluwer. 73–137.

- Beck, S. and Johnson, K. (2004). Double objects again. *Linguistic Inquiry* 35. 97–124.
- Bowers, J. (1981). *The theory of grammatical relations*. Ithaca, NY: Cornell University Press.
- Bowers, J. (1993). The syntax of predication. *Linguistic Inquiry* 24:591–656.
- Barss, A., and Lasnik, H. (1986). A note on anaphora and double objects. *Linguistic Inquiry* 17.347–54.
- Bresnan, J. (2007). Is Syntactic Knowledge Probabilistic? Experiments with the English Dative Alternation. In Sam Featherston and Wolfgang Sternefeld, (eds.) *Roots: Linguistics in Search of its Evidential Base*. Berlin: Mouton de Gruyter, 75–96.
- Bresnan, J., Cueni, A., Nikitina, T. and Baayen, H. (2007). Predicting the dative alternation. In Gerlof Bouma, Irene Krämer & Joost Zwarts (eds.) *Cognitive foundations of interpretation*. Amsterdam: Royal Netherlands Academy of Science. 69–94.
- Bresnan, J., and Nikitina, T. (2009). The Gradience of the Dative Alternation. In Linda Ann Uyechi and Lian-HeeWee, (eds.) *Reality Exploration and Discovery: Pattern Interaction in Language and Life*, Stanford: CSLI Publications. 161–184.
- Bruening, B. (2001). QR Obeys Superiority: Frozen Scope and ACD. *Linguistic Inquiry* 32. 233–273.
- Bruening, B. (2010). Double object constructions disguised as prepositional datives. *Linguistic Inquiry* 41:287–305.
- Bruening, B. (2013). By phrases in passives and nominals. *Syntax* 16:1–41.
- Bruening, B. (2014). Precede-and-command revisited. *Language* 90:342–388.
- Bruening, B. (2018). Double Object Constructions and Prepositional Dative Constructions Are Distinct: A Reply to Ormazabal and Romero 2012. *Linguistic Inquiry* 49. 123–150.
- Chomsky, N. 1995. *The Minimalist Program*. Cambridge, MA: MIT Press.
- Dikken, M. D. (1995). *Particles*. Oxford: Oxford University Press.
- Dryer, M. (1986). Primary Objects, Secondary Objects, and Antidative. *Language* 62. 808-845.
- Goldberg, A. E. (1995). *Constructions: A Construction Grammar approach to argument structure*. Chicago, IL: University of Chicago Press.
- Green, G. M. (1974). *Semantics and syntactic regularity*. Bloomington, IN: Indiana University Press.
- Gropen, Jess, Steven Pinker, Michelle Hollander, Richard Goldberg, and Ronald Wilson 1989. The Learnability and Acquisition of the Dative Alternation in English. *Language* 65. 203–257.
- Hale, K. and Keyser, S. J. (1993). On argument structure and the lexical expression of syntactic relations. In *The view from Building 20*, ed. K. Hale & S.J. Keyser, 53–109. Cambridge, MA: MIT Press.
- Hale, K. and Keyser, S. J. (2002). *Prolegomenon to a theory of argument structure*. Cambridge, MA: MIT Press.
- Hallman, P. (2015). Syntactic neutralization in the double object construction. *Linguistic Inquiry* 46: 389–424.
- Hallman, P. (2018). Double-Object Constructions in Syrian Arabic. *Syntax* 21: 238–274.
- Harley, H. (2002). Possession and the Double Object Construction. *Yearbook of Linguistic Variation* 2. 29–68.

- Harley, H. (2004). Wanting, having, and getting: A note on Fodor and Lepore 1998. *Linguistic Inquiry* 35:255–267.
- Harley, H. (2007). The bipartite structure of verbs cross-linguistically, or, Why Mary can't exhibit John her paintings. <http://ling.auf.net/lingbuzz/000435>.
- Harley, H. (2012). Lexical decomposition in modern syntactic theory. In *The Oxford handbook of compositionality*, ed. W. Hinzen, E. Machery & M. Werning, 328–350. Oxford: Oxford University Press.
- Holmberg, A. (2000). Scandinavian stylistic fronting: How any category can become an expletive. *Linguistic Inquiry* 31:445–483.
- Krifka, M. (2004). Semantic and pragmatic conditions for the dative alternation. *Korean Journal of English Language and Linguistics* 4. 1–32.
- Larson, R. (1988). On the double object construction. *Linguistic Inquiry* 19:335–391.
- Larson, R. (1990). Double objects revisited: Reply to Jackendoff. *Linguistic Inquiry* 21:589–632.
- Larson, R. (2014). *On shell structure*. London: Routledge.
- Levin, B. (1993). *English Verb Classes and Alternations*. Chicago: University of Chicago Press.
- Oehrle, R. T. (1976). *The grammatical status of the English dative alternation*. Ph.D. dissertation, MIT.
- Ormazabal, J. and Romero, J. (2007). The object agreement constraint. *NLLT* 25. 315–347.
- Ormazabal, J. and Romero, J. (2010). The Derivation of Dative Alternations. In Maia Duguine, Susana Huidobro, and Nerea Madariaga, (eds.) *Argument Structure and Syntactic Relations: A Cross-Linguistic Perspective*, Amsterdam: John Benjamins. 203–232.
- Perlmutter, D. and Postal, P. (1984). The 1-advancement exclusiveness law. In *Studies in relational grammar 2*, ed. D. Perlmutter & C. Rosen, 81–125. Chicago: University of Chicago Press.
- Pesetsky, D. (1995). *Zero syntax*. Cambridge, MA: MIT Press.
- Pinker, S. (1989). *Learnability and cognition: The acquisition of argument structure*. Cambridge, MA: MIT Press.
- Pylkkänen, L. (2008). *Introducing arguments*. Cambridge, MA: MIT Press.
- Rappaport Hovav, M. and Levin, B. (2008). The English dative alternation: The case for verb sensitivity. *Journal of Linguistics* 44. 129–167.
- Reinhart, T. (1976). *The syntactic domain of anaphora*. Cambridge, MA: MIT dissertation.
- Reinhart, T. (1983). *Anaphora and semantic interpretation*. Chicago: University of Chicago Press.
- Richards, N. (2001). An idiomatic argument for lexical decomposition. *Linguistic Inquiry* 32:183–192.

## Copyrights

Copyright for this article is retained by the author(s), with first publication rights granted to the journal.

This is an open-access article distributed under the terms and conditions of the Creative Commons Attribution license (<http://creativecommons.org/licenses/by/4.0/>).